U-011 E
C.2.

Statistics Canada
Prices Division

PRICE INDEXES FOR ESCALATION OF INDUSTRIAL CONTRACTS

Ottawa
September 1982

Table of Contents

		Page
0.	Summary	1
1.	Introduction	4
2.	Define the escalation model	5
3.	The index selection process	7
3.1	Review company costs	7
3.2	Preliminary index selection	8
3.2.1	Sources	8
3.2.2	Review the commodity and market characteristics of the indexes	9
3.2.3	Review index weighting patterns	14
3.2.4	Through time, price change does not equal cost change	18
4.	Data Evaluation and Adjustment	19
5.	Define the mechanics of escalation adjustment	25
5.1	Identify the base value of the contract	25
5.2	Identify the indexes selected for the escalation	25
5.3	Specify the weights, the formula, and any smoothing or extrapolation mechanisms which are to be used	26
5.4	Define the mechanisms which will be used to adjust the contract through time	26
5.5	Specify whether there are to be limits for the escalation adjustments	28
5.6	Provide mechanisms to handle revisions to the index series	29
5.7	Miscellaneous factors to specify	31
5.8	Summary review	32
6.	Sources of Information	32
6.1	Publications	33
6.2	Advisory Services	36
6.3	Other Services	37
Appendix A:	Exemplairs of Statistics Canada price indexes	38
Appendix B:	Statistics Canada check list of factors to consider in contract escalation	43

0. Summary

The Prices Division, the Labour Division and the Regional Advisory Services of Statistics Canada have collaborated in preparing a guide to the utilization of price indexes for the escalation of industrial contracts. This 47 page publication identifies the following steps which are a part of the definition and analysis processes for establishing escalation mechanisms.

Section 2. Define the Escalation Model: state the goals of the escalation, a procedure which establishes the framework for assessing the usefulness of available price indexes and the adequacy of existing or proposed company escalation practices.

Section 3.0 The Index Selection Process

3.1 Review company costs, a process which identifies important components of cost, and is a necessary step towards establishing a list of candidate indexes.

3.2 Preliminary index selection. Suggestions are made about characteristics of price indexes which should be assessed by those making contract escalations:

- the kinds of commodities priced and their relative importance;

- the markets the goods are sold in and the currency quoted in;
- the nature of historical price behaviour;
- understanding the difference between price change and cost change;
- how to remake official indexes for escalation contracts.

Section 4. Data Evaluation and Adjustment. Suggestions are made and examples given as to how to evaluate the candidate indexes in relation to the escalation models. If the model demands reasonably uniform month to month change it may be necessary to smooth the data or to amend the escalation formula to accept only some portion of index change.

Section 5.0 Define the mechanics of escalation adjustment

5.1 Identify the base value of the contract.

5.2 Identify the indexes selected for the escalation.

5.3 Specify the weights, the formula and any smoothing or extrapolation mechanisms. (Statistics Canada does not have a "standard" escalation formula)

5.4 Define the mechanisms which will be used to adjust the contract through time. The recommendation is made that contracts specify the use of percentage changes as opposed to point differences.

5.5 Specify whether there are to be limits to the size of adjustment.

5.6 Provide mechanisms to handle revisions to index series.

5.7 Specify the periodicity of adjustment, and state whether preliminary or official indexes only are to be used.

5.8 A final review before signing to consider whether the mechanisms specified will be reasonable under conditions of both high rates of inflation and deflation.

Section 6. Sources of Information

A list of publications and their mid 1982 prices is provided together with relevant phone numbers and addresses of regional advisory services and Ottawa information services.

Appendices: Note particularly Appendix B which contains a set of tables and associated questions which can be incorporated into a data evaluation programme.

Statistics Canada urges those composing contract escalations to take advantage of the available advisory services to obtain explanations about characteristics of the data. Such enquiries also permit the agency to inform users about upcoming revisions to statistical series.

1. Introduction

Recent high rates of price increase have prompted many businesses to incorporate price escalation clauses in longer-term sales contracts. Parties to such contracts have come to believe that some of the risk can be minimized by writing escalation contracts based on published or official statistics. Normally this escalation provides the supplier with some protection against future price increases for such things as labour and materials over which the supplier has no control. In addition, purchasers sometimes find that they can better evaluate competing bids when the "base value" of a contract is unaffected by differing forecasts of future price change for the main elements of cost in the contract.

While responsibility for statistics selection and method of escalation rests with the parties to the contracts, Statistics Canada offers the following summary of the factors which should be kept in mind when selecting price indexes or wage rates for the escalation of industrial contracts. The information in this publication provides general guidance and has been prepared by the Prices Division, the Labour Division and the staffs of the regional advisory services. It is intended to be used as supplementary guidance to the detailed technical notes which the agency prepares for specific series. In addition escalation users should plan on acquiring from the Labour and Prices Divisions descriptions which will be published about up coming major revisions for the average hourly earnings series and the Industry Selling Price Indexes. The necessary phone numbers and addresses for contacting the agency can be found in Section 6 of this document.

2. Define the escalation model

The characteristics of an escalation model which would best meet the conditions of a particular contract should be set down in some detail. This process clarifies everyone's thinking and establishes the framework for the analysis which should assist the process of discovering which indexes and contract escalation terms have the best chance of satisfying the goals of the contract escalation model. This process of model definition and assessment, if done thoroughly, will also ensure that the characteristics of the statistical series are understood and that steps are taken to minimize the impact of data behaviour which does not satisfy the conditions established for the model. The following example illustrates the kinds of objectives which could be identified for a given contract escalation. The sections following contain suggestions of the kind of data review and assessment which should follow the definition of the escalation model.

i) The aim of escalation is to provide a method of compensation for a high proportion of the price change component of annual cost for the main elements of expense which will be incurred during the life of the contract. Indexes selected are effective where the annual percentage change of the index is similar to the annual percentage change in prices paid by the company for materials and services purchased for the contract.

ii) Monthly escalation adjustments should ensure a reasonably uniform apportionment of annual percentage change across the 12 months (or 4 quarters, if such is the case).

iii) Unsuitable index components or weights should be identified and solutions should be devised for overcoming the deficiencies.

iv) The indexes selected should be evaluated for their suitability to the contract both under conditions of annual decreases as well as annual increases.

v) An effort should be made to isolate factors which are unlikely to be captured by the escalation practices normally used. Proposals should be devised which either capture these factors in escalation or to estimate the cost of the required contingency for the base value of the contract.

The above list of objectives for a contract escalation model is by no means exhaustive and should be taken as illustrative of the kinds of objectives which might be appropriate for a given contract.

3. The Index Selection Process

3.1 Review company costs

As part of the process of finding appropriate price indexes for contract escalation, it is necessary to obtain estimates of cost for the main categories of the contract. At the same time, it is necessary to identify main sub-components of contract cost and to determine what change has occurred to such elements of company costs over a period of time, say four or five years. It is necessary to edit company cost data to remove short term changes in cost which are not relevant to the contract being considered. Once this information is at hand, the process of index selection can begin.

Categories of costs can be as follows:

Major cost categories	Sub-component cost categories
Direct costs	
Materials purchased	
Main categories of materials	steel castings
Production equipment used	hourly drill press charges
Labour cost including	
contributions to holiday pay	hourly millwright charges
etc.	hourly carpenter charges

Major cost categories	Sub-component cost categories
Administrative and other costs	
	Foreign exchange
	Cost of money
	Design costs
	Field supervision
	All other expenses
	Profit

While the resulting information on cost can also be used as a source of weights in the escalation formula the sub-component costs for adjacent periods can be used to calculate rates of change in company costs. Care needs to be exercised in selecting cost for reasonably similar trades, materials or machine times.

3.2 Preliminary index selection

3.2.1 Sources

With a list of the main categories of expense in hand, the next step is to review the published price index series and to select those indexes whose commodity content is most closely related to the contract categories of expense. At the same time, related indexes at higher levels of aggregation should be reviewed. To assist this search, a list of Statistics Canada publications has been included in the final section of this paper which

includes mention of most publications used by those preparing contract escalations. Manufacturers' selling prices are published in Statistics Canada publication 62-011 Industry Price Indexes. Also included in that publication are indexes for electricity and some aggregations of raw materials. Those interested in construction wage rates or building materials price indexes can find the required indexes in Statistics Canada publication 62-007 Construction Price Statistics. Also published therein are price indexes for elements of machinery and equipment which might be used to represent price changes for factory equipment used or field equipment used. Also included are price indexes for engineers and technicians salaries which can be useful in relation to escalation for design costs. The CANSIM data base contains foreign exchange rates and interest rate series more extensively than have been reprinted in publication 62-007.

Finally, manufacturing shop labour can be represented by the movement in the average hourly earnings series as published by the Labour Division of Statistics Canada. Their main publications are also listed in Section 6 of this paper.

3.2.2 Review the commodity and market characteristics of the indexes

If a particular contract has castings as a main element of expense, the search for candidate indexes should include a review of both casting indexes as well as the indexes at higher levels of aggregation. In industry classified indexes such as the 71-100

based Industry Selling Price Indexes the index for the industry in which castings are included could also be reviewed. Indexes for castings are to be found in the Industry Selling Price Indexes which are published monthly in Table 1 of Industry Price Indexes, Statistics Canada Catalogue 62-011. The castings indexes and associated higher level indexes are listed in footnote (1) as examples of the kind of identification which should be given any index cited in an escalation contract. The associated index numbers are reprinted in Appendix A.

The differences in index level illustrated in footnote (1) serve as a warning of the importance of gaining an understanding of the composition and behaviour of the series being considered for contract escalation. Accordingly, the commodity content, the terms of sale and the internal weightings of all the indexes under consideration should be examined. For example, while an index may pertain to the appropriate commodity, it may relate to an inappropriate market with the result that the commodity index shows different price behaviour from that experienced by the manufacturer. Also, most industrial price indexes are selected to

---

(1)

						February 1982 Index level
Iron castings, grey, total	Index 12	2940	700	D	630630	262.3
Malleable iron castings	Index 12	2940	701	D	630631	255.5
Steel Castings	Index 12	2910	701	D	527751	332.3
Iron Foundries	Index 12	2940		D	528001	266.7
Primary Metal Industries	Index 12			D	527100	315.8
Primary Metal Industries excluding precious metals	Index 12		700	D	630610	297.2

All of the above indexes are released monthly in Statistics Canada publication 62-011 Industry Price Indexes.

measure the average Canada price movement for sales by domestic manufacturers of a given commodity to a given class of customer. Those manufacturers with unusually large or very small volumes of purchases may very well experience different price movement. Differences in the specifications priced in an index and the purchases of a specific manufacturer may cause divergences in price movement, particularly if non-domestic purchases become a factor for the manufacturer.

Components of indexes should also be examined for their price movement stability because some commodities may be particularly vulnerable to changes in world commodity markets. For example, the movement of the Primary Metals Industries, which is an index at a high level of aggregation, has had its movement substantially changed because of sharp increases and decreases in world prices for gold and silver.

Given below is an example of the kind of information Statistics Canada can provide on request about the item content of indexes. In this instance because of confidentiality problems, fine-level weights cannot be released. However it is possible to say that the weighting system is proportional rather than equally weighted.

Commodity Contents of 2940-700

Iron Castings, Grey Iron, Municipal (man-hole)

Domestic market

Iron Castings, Grey Iron, Ingot moulds and stools

Domestic market

Iron Castings, Grey Iron, N.E.S.

Domestic market

Commodity Contents of 2940-701

Iron Castings, Malleable Iron

Domestic market

Malleable Iron Pipe Fittings, All sizes

Domestic market

Analysts should also identify those characteristics of the indexes which are not compatible with their escalation model. Hypothetical examples illustrate the kind of analysis and documentation which are helpful.

i) Index X contains prices for many types of alloy steels, the movements of which are inappropriate for this contract. The alloy steels tend to rise faster (slower, more erratically) than do the remaining components which generally match the contract's purchase list. The combined weight of the alloy

steels is about 35%. The remaining 65% is representative of our purchases. Alloy steels have been rising on average X % (higher or lower) per year than have carbon steels.

ii) Index K contains prices for both domestic and export sales and their price movement is different. In addition, the prices are quoted in U.S. dollars with the result that index movement is influenced by changes in the value of the Canadian dollar. Over the last four years, this is estimated to have lowered annual average price change by Y %.

iii) Company costs have been unstable during the period under review due to shifts in the mix of new orders. Index R has been evaluated and its contents are reasonably similar to materials being purchased for this contract: the index contains prices for 25 H.P. widgets while we will purchase 20 and 30 H.P. widgets. This index rose 11% last year and 9% the year before. In 1974 and 1975 it fell 5% and 3% respectively.

iv) Historical company costs for Product P are reasonably comparable. The commodity contents of Index P are also comparable. However the discounts this company is able to achieve result in our price experience being substantially different from the published index. While this subject has been discussed with Statistics Canada for longer term improvement, we are examining other alternatives for this contract.

3.2.3 Review index weighting patterns

In addition to reviewing the specifications of the goods included in the indexes being considered, it is also necessary to review the weighting system used in the calculation of the indexes. For most commodity series, Statistics Canada is able to describe the weights used in index calculation. The weighting pattern for Major Group 12: Primary Metals Industries has also been included in Appendix A. This information has been taken from the reference paper, 62-528 Industry Selling Price Indexes, which was released concurrently with the publication of the 1971=100 series. This table is worth close examination, particularly as it relates to the characteristics of the Smelting and Refining Industry. This category includes the gold, silver and platinum prices, which, even with their small weight have exerted a substantial impact on the movement of the Major Group 12 index. This illustrates the point that it is useful to take the time to examine carefully the characteristics of all index components.

At some point in the review process the analyst should decide if it is likely to be more cost efficient over the life of the contract to "remake" available published series to better match the characteristics of the contract. This may arise because none of the published series matches well the characteristics of the contract.

For example, the "Copper and Copper Alloy Rolling, Casting and Extruding" Index(1) is composed of four published commodity indexes each of which has a weight as shown below. Of almost equal importance are a group of unpublished commodities and for the purposes of this discussion let us assume that the residual contains prices for unalloyed copper pipe and tubing only.

			Company Analysis	
Industry 12 2970 D528901(1)	Copper & Copper Alloy Rolling, Casting & Extruding	Published Index Weights	Effective Weights	Manufacturers Estimated Costs for the Current year expressed in 1971 price levels(6)
Sales to the Domestic Market only				
Copper, unalloyed, pipe and tubing(2)		23.9%	71.2	30
Copper, unalloyed, plates, sheets, strip and flat products(3)		10.7%	10.7	
Copper, alloyed, pipe and tubing(4)		3.5%	3.5	70
Copper, alloyed, plates, sheets, strip and flat products(5)		14.6%	14.6	

				June 1982 Published Index
(1)	Index No. 12 2970	D528901	Statistics Canada Catalogue No. 62-011	190.9
(2)	Index No. 12 2970 008	D528919	Statistics Canada Catalogue No. 62-011	187.7
(3)	Index No. 12 2970 009	D528936	Statistics Canada Catalogue No. 62-011	188.5
(4)	Index No. 12 2970 015	D528994	Statistics Canada Catalogue No. 62-011	220.3
(5)	Index No. 12 2970 016	D529009	Statistics Canada Catalogue No. 62-011	202.5

(6) Current year expenses are divided by the appropriate price index to express the expenditure in 1971 price levels. This step permits reaggregation in a compatible fashion with the official indexes, most of which are on a 1971=100 time reference base.

Suppose further that the suppliers estimated contract costs are distributed quite differently and recent index levels suggest that alloyed and unalloyed products have different price movement.

There are three options at this point -

1. Accept the industry level index and assume it will all average out successfully.

2. Consider the next a higher level of aggregation to determine if it is less volatile.
   Primary metal industries excluding precious metals (12 700 D 630610)

3. Reweight published series with appropriate contract weights.

Reweighting series is an easy procedure as is demonstrated below. In this example the company expenditure pattern for the contract has been used to weight together the two most closely related commodity indexes. The February 1980 company index is derived from D528919 and D528994 as follows:

$$\frac{[(30.0 \times 270.3) + (70.0 \times 283.7)]}{100} = 279.7$$

Company Derived Copper Index

Weights (1982 quantities, 1971 prices)		30.0	70.0	100.0
Commodities		D528919	D528994	
Indexes				
1980	February	270.3	283.7	279.7
	May	203.4	227.2	220.1
	August	211.8	231.7	225.7
	November	206.6	228.0	221.6
1981	February	198.6	225.5	217.4
	May	200.0	232.3	222.6
	August	208.6	245.6	234.5
	November	202.8	231.8	223.1
1982	February	198.2	229.8	220.3
	May	200.1	229.4	220.6
	August			
	November			

Indexes at an aggregate level can now be compared.

		Company Derived Copper Index	Industry Index 12-2970	Major Group Index - less precious metals 12 700
1980	February	279.7	278.4	275.3
	May	220.1	209.0	273.4
	August	225.7	214.2	273.7
	November	221.6	213.7	279.1
1981	February	217.4	203.6	279.3
	May	222.6	206.4	290.0
	August	234.5	215.4	296.6
	November	223.1	204.2	293.6
1982	February	220.3	198.5	297.2
	May	220.6	199.3	297.9
	August			
	November			

Because of the volatility both in the short and long term of the series cited here, particular attention should be paid to Section 4 on data smoothing, a suggestion which is relevant for both price indexes and average hourly series(1) which are also often utilized in contract escalation.

3.2.4 Through time, price change does not equal cost change

When comparing company costs through time with official price indexes, users are urged to keep in mind one of the main characteristics of a price index. A price index is designed to reflect how much more (or less) it would cost in successive time periods to purchase an identical basket of goods and services. Changes in costs associated with shifts in quantities and qualities of goods purchased will not be reflected in the movement of the price index. Non-price factors which relate to such events as model changes, changes in customers' terms of sale or quantity discounts, are deliberately excluded from influencing price movement. For example, during a period when prices remain unchanged, a particular purchaser might lose his quantity discount because he now buys in smaller quantities. In this instance, the purchaser's costs have risen but the published price index would show no change. Parties to escalation contracts need to consider the implications of these conventions when designing their contract escalation.

(1) Users selecting average hourly earnings data from Labour Division publications also need to remember that the published series are affected by strikes and changes in the mix of, for example, overtime to straight time which from time to time, can cause sharp short term changes in the direction or rate of change of the series.

4. Data Evaluation and Adjustment

Having selected a short list of indexes which are closely related to the contract, the next step is to identify the characteristics of the price movements. A useful review period could encompass 1972 to 1975 as well as the most recent three or four years. The reason for referring to the earlier price movement is because one can observe how the series behaved during a period of sharp inflation and deflation.

At this point the terms of the index model come into play. If annual company costs for comparable goods and services and price index changes are to be similar, indexes which deviate least from the changes in annual company costs can be rated more highly. If the indexes given such a rating are not specifically related to company purchases it will be necessary to make a careful evaluation of any inappropriate data in the indexes which might cause peculiar behaviour in the future.

If both commodity indexes and indexes at higher levels of aggregations prove to be unsatisfactory escalation measures, it may be necessary to consider aggregating appropriate commodity indexes with a weighting pattern derived from relevant company costs. A demonstration of such a re-weighting was given in the previous section.

If a desirable property of the escalation model is to have reasonably uniform month-to-month changes, such period-to-period changes should be calculated for the indexes selected for not less than 4 or 5 years. If the series often exhibit erratic month to month changes, a smoothing

procedure can be considered. Sometimes Statistics Canada published data are smoothed through seasonal adjustment as is done for the Consumer Price Index and for some average hourly earnings series. The adjusted series retain longer term trend movement while displaying less short term volatile movement.

Most often the series published are not seasonally adjusted with the result that users may wish to subject the series selected to a smoothing procedure. A simple example is provided below wherein the original data have been subjected to an equally-weighted three-month moving average technique. The main impact of this procedure is to reduce the sharp changes in month-to-month movements. (To obtain the results in column 3 of the following table, sum the mid-month index with the 2 adjacent indexes and divide the result by 3.)

Standard statistical texts illustrate other smoothing methods which can be adopted.

Price Index for Granulated Sugar, 1980(1)

Month	Original index		3 month moving average	
	Index	% Change	Index	% Change
January	322.6			
February	426.9	32.3	363.1	
March	339.7	- 20.4	384.7	5.9
April	387.4	14.0	425.4	10.6
May	549.2	41.8	485.1	14.0
June	518.6	- 5.6	508.5	4.8
July	457.8	- 11.7	507.0	- 0.3
August	544.7	19.0	526.7	3.9
September	577.7	6.1	587.8	11.6
October	640.9	10.9	606.7	3.2
November	601.6	- 6.1	571.5	- 5.8
December	472.0	- 21.5		

(1) Industry Selling Price Index for Granulated White Sugar of any grist, not processed.
Index No. 01 1082 001 D 509402
Statistics Canada, Catalogue No. 62-011

The main benefit of a smoothing procedure is to uncouple the short-term events (which may not be specifically relevant to a given contract) from more general trends which are, for the purposes of the escalation, defined to be relevant.

The discussion on smoothing techniques has been directed to reducing the impact of shifts in the direction of short term price movement.

Consideration should also be given to changes in direction in longer term price movement. By way of illustration consider the behaviour of the Industry Selling Price Index for refined copper (12 2950 004 D528363). The annual index rose steadily from 64.0% in 1961 to 122.2% in 1970. From its peak of 122.2 it moved as follows:

	Annual index	Percentage change
1970	122.2	
1971	100.0	- 18.2
1972	96.3	- 3.7
1973	144.7	50.3
1974	169.1	16.9
1975	116.2	- 31.3
1976	126.6	9.0
1977	136.7	8.0
1978	147.1	7.6
1979	215.7	46.6
1980	238.7	10.7
1981	203.7	- 14.7

Two characteristics of this series give particular problems to those planning contract escalation: the sharp reversals in direction (see 1970 to 1973) and the atypical increases which can also occur (see 1973/72 and 1979/78). While copper on the spot market can indeed be moving in this direction it may well be that the prices being paid for a particular contract do not show the same behaviour. In such an instance a more stable higher level aggregative index such as the Primary Metals Industries (D527100 12) might better serve the company's purpose.

An alternative approach would be to take some agreed to portion of both increases and decreases. Suppose for example, that a contract were signed in April of 1974; progress payments beginning in May could be affected by the following price movement:

D528363
Refined copper
12 2950 004

1974	February	181.6	1980	February	325.5
	March	206.4		March	238.4
	April	214.4		April	228.3
	May	210.6		May	220.9
	June	191.8		June	214.7
	July	165.8		July	231.4
	August	159.1		August	237.8
	September	140.5		September	235.6
	October	135.9		October	229.0
	November	133.7		November	226.3

If prior price committments had been made to suppliers perhaps the escalation should be arbitrarily held at 100 until the termination of those committments at which time adjustments could subsequently be made as per the movement of an appropriate index.

If the firm prices held to September1974, the contract might stipulate that fact and state that index movement as per the index selected would only be incorporated from the October 1974 progress payment, e.g.

$$\frac{135.9}{140.5}$$

Another way of softening the impact of price declines is to state that only a certain portion of any decline will be worked into formula. Another mechanism is to apply an earlier index to the progress payment. For example, adjustment to July progress payments could be on the basis of the April index level on the basis that April prices are appropriate in July, orders for goods having been made three months earlier.

These numerical examples together with some suggested solutions to the data problems serve to illustrate the necessity for careful analysis of the price indexes, company costs and the supply arrangements as they relate to contract escalation practice. Given the longer term volatility of some series the potential for losses is large if some specific attention is not paid to considering the effectiveness of the escalation under conditions of longer term price decline. It may also be necessary to be flexible in escalation practice to best accommodate the range of situations which are important in a given contract.

A few additional points should be considered before establishing the contract mechanisms.

1. Is either party a major respondent to the series being selected?

2. If the timeliness of release of the indexes is troublesome, is it necessary to devise an extrapolation procedure?

3. Has the producing agency been contacted to determine if up coming major revisions are likely to affect the series selected? Have they been asked to provide notification to the company if the series selected is about to undergo major alteration?

4. Is traditional escalation practice eliminating from consideration some element of cost which is now or expected to become important? Have proposals been formulated to recoup the cost of this element?

5. Define the mechanics of escalation adjustment

5.1 Identify the base value of the contract

The base value should be specified in as much detail as possible. State whether the base value refers to a per-unit quantity, a certain volume of units or a value. Give the effective date of this base value and indicate the length of time it will remain in effect.

5.2 Identify the indexes selected for the escalation

It is important to give a proper citation for each selected series. An example follows:

Series 12 2910 043 Bars, concrete reinforcing (D 527305) published monthly in Statistics Canada publication 62-011, Industry Price Indexes.

Series 12 indicates major group 12 from the 1970 Standard Industrial Classification. The number 2910 is the 4 digit identifier in the SIC for the Iron & Steel Mills Industry. The number 043 is a Prices Division commodity identifier. The "D" number is the CANSIM identifier for series 12 2910 043. (CANSIM is Statistics Canada's computerized information data base.)

5.3 Specify the weights, the formula, and any smoothing or extrapolation mechanisms which are to be used

Weights give the proportional representation of the items to be escalated. These weights usually reflect as closely as possible the contract input cost structure. If the input cost structure is based on some period c different from the price reference period of the price indexes, the input costs should be expressed in terms of base price reference period, i.e., 1971 prices in the case of the ISPI. This can be done by dividing each input cost by its escalation price index for period c with respect to the base period. This is necessary to derive a constant weight index in terms of period c quantities at base period prices.

The weights are often expressed in the form of a percentage, such that the sum of the weights for all the series used is 100. (In this mode, the escalation index may be applied to something less than the full value of the contract.)

Formula selection, smoothing and extrapolation mechanisms are the responsibility of the parties to the contract. Standard texts on business statistics will offer guidance as to procedure. Statistics Canada does not have a "standard" escalation formula.

5.4 Define the mechanisms which will be used to adjust the contract through time

State in detail the mechanism to be used for the timing of escalation calculations and the item(s) and amount(s) to be escalated.

As a general rule, utilize the percentage change in an index as opposed to citing the use of actual index numbers or the point differences. (This reduces the problems caused by major revisions to series.) For example, if a base value is $1,000.00 in January 1980 and the Total Industry Selling Price Index, 1971 = 100 (ISPI) was used as an escalator every January, the 1981 value would be calculated as follows:

Base value	$1,000.00
ISPI, January 1980	239.0
ISPI, January 1981	263.3
percentage change in ISPI between Jan. 1980 and Jan. 1981	10.2%
Escalated value	$1,102.00

Using the above example, it can be observed that the base value will change by $4.18 for every point change in the index.

Base value	$1,000.00
ISPI, January 1980	239.0
ISPI, January 1981	263.3
Point change in ISPI between Jan. 1980 and Jan. 1981	24.3
Escalated value: [(24.3 X $4.18) + $1,000.00] =	$1,101.57

The resulting escalated value is virtually the same as that derived from the percentage change method. If, however, the ISPI is rebased and the ISPI for January 1980 is 100.0, then the January 1981 will be 110.2 and not 263.3. While the percentage change is the same the point differences are less. In this case, the escalation value derived from the point change method becomes $1,042.64 and not $1,101.57. This loss of $58.93 arises from the change in the level

of the indexes which is a function of the length of elapsed time from the time-base period of the index and has nothing to do with the estimate of price change for the period under review.

One way to avoid this effect for contract escalation is to cite percentage changes as opposed to making use of index point differences. Another way is to use the movement of the new indexes to move forward the level of the old and continue to calculate point differences from the same index level.

5.5 Specify whether there are to be limits for the escalation adjustments

Escalation clauses may occassionally contain a "floor," a "ceiling," or both, to limit the total price adjustment during the life of the contract. If the upper or lower limit is reached, the parties may renegotiate price setting mechanisms for the remainder of the contract. Some contracts specify that no price adjustment will be triggered until a minimum change in the selected index has taken place. Contracts may also provide that an escalation is to apply in both an upward and a downward direction. Alternatively, contracts can also specify that escalation shall apply only to a specified portion of the change registered in the series cited.

5.6 Provide mechanisms to handle revisions to the index series

Writers of long-term contracts need to avail themselves of means of amending the escalation calculations, if for no other reason than that the statistical agency may discontinue the index series cited in the contract and a suitable substitute may not be available for the life of the contract. There are three main types of changes to index series which may affect contract escalation users:

(a) those which affect the continued availability of a series, as occurs when a series is discontinued either because of insufficient respondents or because the agency can no longer afford to produce the series.

(b) those instances where changes in definition or concept change the characteristics of the series.

(c) those which affect the level of the most recently published series.

Once the index selection has been agreed upon, the contracting parties should ensure that the contract is written in such a way that the time base, title and content changes, as occur under (a) and (b) above, can be accommodated without invalidating the escalation provisions of the contract. The impact of such changes can be reduced by making sure that Statistics Canada is informed as to

which series will be cited in the contract. Such advance notification permits the agency to warn users of planned major changes. When such major changes result in the disappearance or major alteration of a series selected, Statistics Canada will offer advice to assist users in their search for a substitute series. Statistics Canada cannot, however, guarantee the continued existence of any series.

To accommodate revisions to the levels of the most recently published numbers (a C type change), contracts should specify whether originally published (Preliminary) or final (Official) data will be used to calculate price adjustments. Under present Statistics Canada policy, each data series is subject to a different revision schedule for the most recently published numbers. For example, the Industry Selling Price Index (1971=100) and the Raw Materials Price Index are subject to revisions for the most recent six months. Under unusual circumstances, however, there may be exceptions to these rules. In recent years, such exceptional adjustments have occurred mainly in the machinery and equipment series of the Industry Selling Price Indexes.

The following table provides an example of the revisions to recently published indexes for Industry Selling Price Indexes, Major Group 12, Primary Metal Industries and Major Group 14, Machinery Industries (except electrical).

Selected Months in 1981	Index as First Published (Preliminary)	Levels of Revised Indexes			
		After 3 Months		After 6 Months	
		Preliminary Index	% Difference	Final Index	% Difference
Major Group 12, Primary Metal Industries					
June	313.8	314.4	0.2	313.7	-
July	309.8	309.8	-	309.9	-
August	315.1	315.6	0.2	315.6	0.2
September	316.4	316.8	0.1	317.5	0.3
October	316.4	316.8	0.1	317.2	0.3
Major Group 14, Machinery Industries (except electrical)					
June	229.0	231.4	1.0	231.3	1.0
July	230.8	233.7	1.3	234.2	1.5
August	232.0	235.5	1.5	236.0	1.7
September	237.1	238.0	0.4	239.0	0.8
October	239.2	240.8	0.7	241.6	1.0

5.7 Miscellaneous factors to specify

An escalation clause should also specify: (a) Whether price adjustments are to be made at fixed intervals, such as quarterly, semi-annually, or annually; (b) the specific reference period of the indexes - a monthly index as specified, an annual average, or an average for some other time period - which is set as the basis for determining a price adjustment; (c) when the calculated price adjustment becomes effective, and (d) how revisions to most recently published data are to be accommodated, that is to say are preliminary indexes acceptable or will official numbers only be acceptable.

5.8 Summary review

At this point, don't sign the contract! Both parties need to consider longer term changes in price movement, the cost of money, the impact of shortages or delays of supply and satisfy themselves that the mechanisms are satisfactory under conditions of high inflation and high deflation. Particular attention needs to be paid to what has been squeezed out of the contingency component of the base value of the contract. Purchasers need to evaluate proposed escalation terms from the point of view of the probable impact on cash flow and the risk of escalation cost over running the project budget.

6. Sources of Information

Statistics Canada uses a number of means to disseminate data: data can be obtained through subscription to Statistics Canada publications or by obtaining print-outs or tapes from the agency's computerized data base - CANSIM. When the information becomes available for the first time, it appears in the Statistics Canada Daily, usually in a condensed form. At the same time, the data is released through CANSIM. Usually publications are released a number of days later. For the release of data by phone, user advisory services are maintained in a number of regions, the phone numbers of which are listed on pages 36 and 37 of this publication.

The Statistics Canada library and the Prices Division are also able to provide some guidance as to the availability of data in the United Nations or other official statistical publications.

6.1 Publications

The following is a list of publications, often used as source information for escalation purposes. Prices provided were those prevailing in Canada at the time this publication was prepared.

62-011 Industry Price Indexes. Monthly. Bilingual. 183 pp. (ISSN 0700-2033). ($3.50 a monthly, $35.00 a year)

Monthly and annual indexes of industry selling prices, for manufacturing industries, with commodity detail; purchase price indexes of selected industrial materials, and energy selling price indexes; tables, charts and graphs; explanation of methods used.

72-002 Employment, Earnings and Hours. Monthly. Bilingual. 128 pp. (ISSN 0380-6936). ($4.00 monthly, $40.00 a year)

Industry and area data on industrial employment, average weekly earnings, average weekly hours, average hourly earnings; explanation of methods used.

62-007 Construction Price Statistics. Monthly. Bilingual. 58 pp. (ISSN 0319-8243). ($3.00 monthly, $30.00 a year)

Contains price indexes of inputs into construction (materials, construction wage rates, construction machinery and equipment), contractors selling prices and special purpose aggregations of price indexes for construction and machinery and equipment relating to specified categories of capital expenditures. Presents detailed residential and non-residential input price indexes, and plant indexes for electric utilities, telecommunications, petrochemical and chemical and mineral plants. Explanation of methods used is provided.

62-001 The Consumer Price Index. Monthly. Bilingual. 32 pp. (ISSN 0703-9352). ($2.50 monthly, $25.00 a year)

Normally issued in the second week of the month following the reference period. This first monthly release of The Consumer Price Index for Canada and for the 15 regional cities provides a descriptive capsule summary of retail price movements and the factors underlying them. Also contains tabular information presenting: latest price index movements for the seven major components; price index changes on one and 12-month bases for an extensive number of components and groups; historical monthly information; seasonally adjusted monthly price movements; and price indexes reclassified according to categories of goods and services.

62-010 Consumer Prices and Price Indexes. Quarterly. Bilingual. 120 pp. (ISSN 0380-691X). ($6.00 quarterly, $24.00 a year)

A quarterly compendium of consumer prices and price index related information of both a current and historical nature. A separate section of the report presents place-to-place comparative consumer prices information. The last calendar quarter edition includes a supplement which examines price movements in retrospect for the last 12 months.

62-004 Farm Input Price Indexes. Quarterly. Bilingual. 17 pp. (ISSN 0383-4875). ($4.00 quarterly, $16.00 a year)

Indexes of prices of commodities and services used in Canadian farming operations for Eastern, Western, and all Canada. Contains up to three years of quarterly and annual statistics.

62-003 Index Numbers of Farm Prices of Agricultural Products. Monthly. Bilingual. 4 pp. (ISSN 0380-7541). ($1.50 monthly, $15.00 a year)

Overall indexes of prices received by farmers from the sale of farm products, Canada and the provinces; notes regarding content, methods and sources.

6.2 Advisory Services

Statistics Canada is able to help you identify, obtain and use statistics. Our Regional Advisory Services have reference centres in nine cities across the country where you are welcome to telephone or drop in, use the study areas, arrange to buy one or more publications or obtain statistics from CANSIM, the bureau's computerized data bank. The Regional Advisory Services has staff to assist you in these centres:

2nd floor
Viking Building
Crosbie Road
St. John's, Nfld.
A1B 3P2
(709-726-0713)

3rd floor
1256 Barrington St.
Halifax, N.S.
B3J 1Y6
(902-426-5331)

7th floor
1500 Atwater Ave.
Montréal, Qué.
H3Z 1Y2
(514-283-5725)

10th floor
25 St. Clair Ave. E.
Toronto, Ont.
M4T 1M4
(416-996-6574)

6th floor
266 Graham Ave.
Winnipeg, Man.
R3C 0K4
(204-949-4020)

5th floor
530 Midtown Centre
Regina, Sask.
S4P 2B6
(306-359-5405)

10th floor
10025-106th St.
Edmonton, Alta.
T5J 1G9
(403-420-3027)

1st floor
1145 Robson St.
Vancouver, B.C.
V6E 1B8
(604-666-3691)

6.3 Other services

Toll-free Telephone Access for Those Residing Outside Local Dialing Areas

Newfoundland and Labrador	Zenith 0-7037
Nova Scotia, New Brunswick and Prince Edward Island	1-800-565-7192
Quebec	1-800-361-2831
Ontario	1-800-268-1150
Manitoba	1-800-282-8006
Saskatchewan	1(112)800-667-3524
Alberta	1-800-222-6400
British Columbia (South and Central)	112-800-663-1551
Yukon and Northern B.C. (area served by Northwest Telephone Co.)	Zenith 0-8913
Northwest Territories (area served by Northwest Telephone Co.)	Zenith 2-2015

Ottawa advisory services

Main library	613-995-9035
Prices Division	
Industrial and Farm Indexes	613-995-5738
Construction and Capital Expenditures	613-996-3744
Consumer Prices	613-995-4078
Labour Division	613-992-5613
Ottawa regional advisory services	613-992-4734
Ottawa mailing address:	Statistics Canada, Ottawa, K1A 0T6

Appendix A: Excerpts from Statistics Canada publication 62-011: Industry Price Indexes

Primary metal industries - Première transformation des métaux.	1961	74.5	74.0	74.1	74.2	74.6	75.1	76.8	76.8	76.7	76.7	76.6	76.9	75.6
	1962	76.7	76.6	76.6	76.6	77.9	77.6	77.6	77.5	77.5	77.5	77.6	77.2	77.2
	1963	77.3	77.4	77.4	77.5	77.6	77.6	77.7	77.9	77.9	78.2	78.3	78.3	77.8
	1964	78.8	78.8	79.1	79.7	79.7	79.7	80.0	80.0	81.0	81.0	81.4	81.9	80.1
D 527100 12	1965	81.8	82.3	82.5	82.7	84.2	84.3	84.5	84.5	84.4	84.4	85.3	85.3	83.9
	1966	86.9	87.0	87.0	86.9	87.0	87.2	87.0	87.1	87.1	86.9	88.1	88.1	87.2
	1967	88.2	89.5	89.6	89.6	89.5	89.4	89.5	89.4	90.6	90.6	90.7	92.4	89.9
	1968	92.1	93.6	94.1	92.0	90.9	91.5	89.7	89.6	89.9	89.6	89.8	90.5	91.1
	1969	93.3	93.7	94.4	95.2	95.7	96.8	96.8	98.7	99.3	99.6	100.9	105.3	97.5
	1970	103.4	105.8	107.1	107.3	106.1	104.2	102.7	101.4	100.9	100.6	100.2	99.6	103.4
	1971	99.4	98.6	99.4	100.3	100.1	100.1	100.9	100.6	100.3	100.2	100.2	100.0	100.0
	1972	100.7	101.1	101.9	102.1	102.0	101.4	101.7	101.6	102.6	103.5	103.6	104.7	102.2
	1973	106.1	108.2	111.4	113.3	116.5	116.9	119.9	120.8	121.5	123.7	125.5	126.6	117.5
	1974	131.7	137.3	143.5	148.0	150.4	149.9	149.4	150.8	151.1	152.6	154.0	153.8	147.7
	1975	156.6	158.7	158.6	159.2	159.9	158.9	159.1	160.3	163.4	165.1	164.9	164.3	160.8
	1976	163.8	163.7	164.3	166.9	167.9	169.3	171.1	171.9	171.8	172.8	174.7	180.6	169.9
	1977	182.4	185.5	189.1	190.4	190.7	188.9	191.9	191.9	191.9	194.1	195.0	194.7	190.5
	1978	196.9	197.8	198.9	203.6	202.3	204.5	205.6	209.7	212.3	219.6	220.5	221.3	207.8
	1979	228.8	237.9	240.6	249.7	253.1	257.0	257.4	259.9	267.2	282.7	282.2	296.3	258.8
	1980	314.6	318.9	301.5	301.9	299.2	301.8	304.2	305.9	311.7	317.3	313.1	309.5	308.3
	1981	310.0	304.9	309.5	312.1	313.7	313.5	309.8						
Primary metal industries excluding precious metals - Première transformation des métaux sauf les métaux précieux	1971	99.4	98.6	99.4	100.3	100.1	100.1	100.9	100.5	100.3	100.2	100.2	100.0	100.0
	1972	100.5	100.8	101.6	101.7	101.5	100.5	100.5	100.4	101.4	102.3	102.5	103.5	101.4
	1973	104.9	106.7	109.7	111.2	113.1	113.5	115.6	118.7	119.1	121.3	123.7	124.1	115.2
	1974	128.2	132.3	138.3	142.8	145.1	144.9	145.4	146.1	146.4	147.6	147.5	147.6	142.7
D 630610 12 700	1975	150.6	152.4	152.7	154.0	154.3	153.4	153.4	154.7	158.5	160.7	160.5	160.3	155.5
	1976	160.0	160.0	160.6	163.4	164.5	165.8	167.8	169.2	169.3	170.1	170.9	177.3	166.6
	1977	179.4	182.2	185.2	186.4	186.9	185.5	188.3	188.1	187.9	189.3	189.9	189.9	186.6
	1978	191.2	191.6	191.8	196.8	196.1	197.9	198.7	201.2	203.7	210.1	212.1	212.8	200.3
	1979	218.9	226.9	230.6	240.8	242.3	244.9	244.6	246.5	249.9	260.4	261.2	263.8	244.2
	1980	266.0	275.3	269.1	276.2	273.4	270.4	272.4	273.7	275.0	279.7	279.1	278.1	274.0
	1981	279.1	279.3	284.8	288.6	289.9	290.7	290.9						
IRON AND STEEL MILLS - SIDERURGIE	1956	76.4	76.7	76.7	77.1	77.3	77.7	77.8	80.2	80.9	82.7	82.7	82.7	79.1
	1957	82.8	83.2	83.3	83.9	84.5	84.5	85.0	85.0	85.0	85.1	85.1	85.0	84.4
	1958	85.0	85.0	85.0	85.1	85.1	85.1	84.9	84.9	84.9	85.2	85.5	86.3	85.1
	1959	85.5	85.3	85.3	85.6	85.6	85.4	85.4	85.6	85.6	85.7	85.8	85.7	85.5
D 527101 12 2910	1960	86.0	85.9	85.7	85.8	85.8	85.8	85.8	85.8	85.8	85.8	85.8	85.8	85.8
	1961	85.5	85.5	85.5	85.4	85.5	85.4	85.1	85.1	85.1	85.1	85.2	85.2	85.3
	1962	85.2	85.2	85.2	85.1	85.1	85.1	85.1	85.1	85.1	85.1	85.1	85.0	85.1
	1963	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.0	85.1	85.1	85.0	84.5	85.0
	1964	84.6	84.7	84.6	84.6	84.7	84.8	84.7	84.7	84.7	84.7	84.7	84.6	84.7
	1965	84.6	84.9	85.2	86.3	87.0	87.1	87.1	87.1	87.2	87.1	87.1	86.9	86.5
	1966	86.7	86.7	86.8	86.7	86.8	86.8	86.9	86.9	86.9	86.8	86.9	86.7	86.8
	1967	87.3	88.0	88.0	88.6	88.5	88.5	88.5	88.5	88.3	88.3	88.3	88.1	88.2
	1968	88.0	87.9	87.9	87.9	87.9	87.9	87.9	87.9	87.9	88.0	88.0	88.0	87.9
	1969	88.4	88.5	89.9	90.3	90.8	90.9	91.0	91.3	91.4	91.7	93.8	94.9	91.1
	1970	95.5	95.5	95.6	95.9	96.0	96.0	96.0	96.0	96.0	96.0	96.1	96.3	96.1
	1971	98.4	98.4	98.9	99.4	99.4	99.8	100.5	100.7	100.7	100.9	101.2	101.9	100.0
	1972	102.1	102.0	102.0	102.5	102.9	102.9	102.9	102.5	102.9	104.5	104.8	106.8	103.2
	1973	106.8	106.9	107.4	108.5	109.4	109.4	111.5	111.9	112.3	112.5	113.5	115.2	110.4
	1974	118.4	122.3	126.9	130.4	135.4	138.0	140.0	141.3	143.3	145.6	145.7	148.5	136.2
	1975	152.5	156.8	157.0	159.2	159.2	159.1	159.0	159.6	167.8	170.4	171.8	171.8	162.0
	1976	171.7	171.4	171.6	174.9	175.3	177.6	178.5	180.2	180.6	181.3	181.8	181.8	177.2
	1977	182.3	185.5	184.9	185.3	185.1	184.8	187.1	190.7	191.0	191.9	193.1	193.5	187.9
	1978	193.4	193.9	194.3	200.5	203.0	203.3	204.6	205.4	207.6	213.0	213.7	214.1	203.9
	1979	217.9	219.3	220.7	231.0	231.9	231.9	233.7	236.4	238.3	246.4	248.4	248.5	233.7
	1980	249.9	250.2	251.7	262.2	262.8	263.2	263.1	262.8	264.2	270.0	270.1	270.5	261.7
	1981	273.0	274.7	281.9	288.6	288.8	280.9	288.9						
STEEL PIPE AND TUBE MILLS - FABRIQUES DE TUBES ET TUYAUX D'ACIER.	1961	x	x	x	x	x	x	x	x	x	x	x	x	x
	1962	x	x	x	x	x	x	x	x	x	x	x	x	x
	1963	x	x	x	x	x	x	x	x	x	x	x	x	x
	1964	98.7	98.4	98.8	98.1	95.3	94.7	95.1	96.9	94.6	93.6	94.2	94.5	96.7
	1965	95.2	99.9	99.3	98.0	96.9	97.1	100.9	103.4	101.8	103.1	103.4	103.0	100.2
D 527801 12 2920	1966	102.1	101.9	101.4	101.1	101.1	102.8	98.9	101.7	102.7	100.7	101.4	101.4	101.5
	1967	99.2	99.6	100.1	98.0	97.5	95.8	96.9	96.2	95.9	95.9	95.7	95.8	97.1
	1968	94.7	94.7	95.0	95.0	94.7	93.1	94.0	93.6	92.6	92.1	92.8	93.5	93.8
	1969	93.3	93.6	93.2	93.1	92.5	92.6	92.6	93.0	94.2	96.2	96.7	96.6	94.0
	1970	96.5	97.6	97.1	98.0	98.0	97.0	96.7	97.3	97.1	98.1	97.6	98.4	97.3
	1971	99.0	99.6	99.5	99.5	99.5	99.6	99.5	99.6	99.6	101.3	101.7	101.7	100.0
	1972	101.7	101.7	101.7	101.6	101.6	101.5	101.5	101.5	101.5	106.7	106.7	106.7	102.9
	1973	106.7	108.6	108.6	109.4	109.6	109.9	110.6	113.3	113.6	115.8	115.8	115.8	111.5
	1974	126.6	126.9	127.9	128.4	130.4	130.4	130.4	130.4	130.9	140.6	140.7	140.7	132.0
	1975	153.3	157.1	157.5	160.5	160.6	160.6	160.1	160.5	161.5	174.3	174.3	174.3	162.9
	1976	174.3	174.3	174.3	174.5	176.0	178.0	179.8	180.1	180.7	186.1	186.1	186.6	179.1
	1977	186.6	187.4	190.9	191.8	191.8	191.8	203.4	203.9	204.9	205.1	208.0	208.0	197.8
	1978	208.5	210.2	210.5	212.4	214.4	215.0	223.0	223.0	223.0	223.6	225.5	226.5	218.0
	1979	241.6	241.6	241.7	243.8	243.8	243.8	244.3	245.6	252.3	259.2	259.4	259.4	248.1
	1980	259.4	260.3	260.3	270.4	278.5	278.5	278.5	278.5	278.5	290.5	290.9	290.9	276.9
	1981	302.8	304.9	304.9	313.9	313.9	318.8	318.8						
Mechanical tubing, carbon steel, welded - Tubes mécaniques, d'acier ordinaire, avec soudure.	1969	93.2	93.2	93.2	93.2	93.2	93.2	93.2	94.3	94.3	94.3	96.0	96.9	94.0
	1970	96.9	96.9	96.9	96.9	96.9	96.9	98.2	98.2	98.2	98.7	98.7	98.7	97.7
	1971	x	x	x	x	x	x	x	x	x	x	x	x	x
	1972	x	x	x	x	x	x	x	x	x	x	x	x	x
D 527844 12 2920 003	1973	x	x	x	102.5	104.6	104.6	112.1	112.1	112.1	112.1	112.1	112.1	x
	1974	120.6	122.3	124.6	124.6	124.6	124.6	124.6	124.6	127.4	127.4	127.4	127.4	125.0
	1975	127.4	145.4	148.1	148.1	148.1	148.1	148.1	148.1	148.1	158.1	158.1	158.1	148.2
	1976	158.1	158.1	158.1	158.7	165.2	165.2	165.2	163.4	163.4	163.4	163.4	163.4	161.6
	1977	163.4	173.2	173.2	177.5	177.6	177.6	177.8	177.8	184.1	189.7	189.7	189.7	179.3
	1978	189.7	189.7	190.0	190.0	194.1	194.1	194.1	194.1	194.1	197.4	216.5	216.5	196.7
	1979	216.5	216.5	216.5	231.4	231.4	231.4	231.4	231.4	236.8	245.8	245.8	245.8	231.7
	1980	245.8	245.8	245.8	260.7	260.7	260.7	260.7	260.7	260.7	264.1	267.9	267.9	258.5
	1981	267.9	268.4	268.4	256.2	256.2	256.2	256.2						
IRON FOUNDRIES - FONDERIES DE FER	1961	75.9	75.5	75.7	75.8	75.8	76.1	76.1	76.3	75.9	75.8	75.6	75.6	75.8
	1962	75.5	75.2	75.5	75.7	75.8	76.1	76.3	76.4	75.9	75.8	75.8	76.0	75.8
	1963	76.8	76.8	76.6	77.0	77.0	77.1	77.1	77.8	77.8	77.9	78.0	77.9	77.3
	1964	77.8	78.2	78.2	78.2	78.2	78.2	78.1	78.1	79.3	79.3	79.3	79.3	78.5
D 528001 12 2940	1965	80.5	80.5	80.9	81.0	81.1	81.4	81.8	81.8	81.8	81.8	81.9	81.9	81.4
	1966	83.4	83.5	83.6	83.7	83.7	84.3	84.3	84.3	84.4	84.4	84.8	84.8	84.1
	1967	86.5	86.7	86.5	86.5	86.5	86.6	88.4	88.3	88.5	88.2	88.4	88.8	87.5
	1968	89.0	90.1	90.1	90.3	90.3	90.4	90.4	90.4	90.6	90.5	90.7	90.7	90.3
	1969	91.9	92.1	92.2	92.2	92.2	92.3	92.7	92.6	92.6	93.1	93.4	93.5	92.6
	1970	94.0	95.9	96.0	96.9	97.6	97.5	97.4	97.2	97.2	97.4	97.5	97.4	96.8
	1971	97.3	98.5	99.6	99.7	99.7	100.2	100.9	100.8	100.8	100.7	100.9	101.0	100.0
	1972	101.8	102.8	103.0	102.9	102.8	102.3	102.5	102.9	102.9	103.0	104.4	105.1	103.0
	1973	105.6	108.6	108.7	107.5	107.5	108.0	108.8	109.3	109.8	109.8	116.9	117.6	109.6
	1974	117.7	123.3	128.9	135.4	138.6	139.3	141.9	148.1	149.8	154.7	158.9	162.3	141.6

Note: Indexes for the most recent six months shown are subject to revision.
Note: Les indices figurant pour les six mois les plus récents sont sujets à révision.
See (ustnote(s) at end of table. - Voir note(s) à la fin du tableau.

TABLE 1. Industry Selling Price Indexes by Major Groups, Industries and Selected Commodities

TABLEAU 1. Indice des prix de vente dans l'industrie par groupes, industries et par certains produits

1971 = 100

		Month - Mois												Annual average - Moyenne annuelle
		Jan. - Janv.	Feb. - Fév.	March - Mars	April - Avril	May - Mai	June - Juin	July - Juill.	Aug. - Août	Sept.	Oct.	Nov.	Déc.	
	1975	163.2	163.4	163.5	163.9	164.5	169.4	169.6	170.8	171.7	174.0	173.4	173.4	168.4
	1976	172.4	180.6	179.8	180.5	181.0	181.1	181.1	180.8	182.4	182.5	184.3	184.9	181.0
	1977	185.2	185.2	185.9	186.7	186.3	188.5	187.9	190.9	191.9	191.9	196.0	196.4	189.6
	1978	196.8	197.7	197.7	197.9	198.1	199.0	200.8	200.4	200.7	201.8	205.2	206.6	200.1
	1979	209.7	211.8	214.4	219.6	222.7	227.1	227.1	228.6	228.6	229.1	229.7	231.6	223.3
	1980	233.8	235.9	238.5	240.1	239.9	240.6	243.1	243.2	250.3	250.4	250.6	252.1	243.2
	1981	254.7	258.6	261.4	261.7	262.1	262.1	262.1						
Iron castings, grey, total - Fontes de moulage grise, total	1971	98.7	98.8	99.4	99.4	99.5	100.5	101.4	101.1	101.2	100.9	100.8	100.6	100.0
	1972	100.9	102.9	103.0	102.8	102.6	102.0	102.3	102.2	102.2	102.4	102.5	104.0	102.5
	1973	105.8	106.1	106.3	106.3	108.4	108.6	110.0	110.5	110.6	110.7	117.2	118.0	110.4
	1974	118.0	121.0	125.9	128.8	131.4	132.2	134.0	136.9	140.6	143.0	150.2	155.6	134.8
D 630630 12 2940 700	1975	157.5	157.8	158.1	158.7	159.9	169.1	168.5	170.8	168.3	172.4	171.1	171.1	165.3
	1976	169.1	184.3	182.4	183.8	185.0	184.9	184.5	183.8	185.3	185.4	187.9	189.1	183.8
	1977	190.1	190.3	190.5	190.8	193.4	193.7	192.5	196.5	198.7	198.7	204.9	205.9	196.5
	1978	206.7	207.3	207.3	207.0	207.5	207.6	211.3	210.6	210.3	210.4	217.5	217.7	210.1
	1979	219.3	223.8	225.4	227.0	228.2	228.6	230.2	233.3	233.4	232.9	233.0	235.7	229.2
	1980	238.1	239.1	240.8	241.4	241.0	240.7	241.7	241.8	254.2	254.3	253.8	255.1	245.2
	1981	257.6	258.1	259.3	260.5	260.8	260.6	260.6						
Malleable iron castings (including fittings) - Fontes de moulage malléables (raccords inclus).	1971	96.6	97.3	99.7	100.3	100.3	100.3	100.3	100.3	100.3	100.3	101.6	102.8	100.0
	1972	106.6	106.6	107.0	107.0	107.0	107.0	107.0	109.4	109.4	109.4	109.5	109.5	108.0
	1973	109.5	110.2	110.2	112.4	112.4	112.4	113.2	114.6	115.9	115.9	120.5	120.5	114.0
	1974	120.5	121.2	121.2	134.9	134.9	134.9	143.6	166.5	166.5	166.5	167.3	167.3	145.4
D 630631 12 2940 701	1975	167.7	168.1	168.1	168.1	168.1	167.4	167.4	167.4	178.7	178.9	178.5	178.5	171.4
	1976	178.0	183.5	183.1	183.2	183.0	183.9	184.4	184.8	189.3	189.3	192.8	192.8	185.7
	1977	192.1	192.1	192.1	192.5	194.3	194.3	194.3	199.4	198.4	196.4	204.4	204.4	196.3
	1978	204.4	207.7	207.8	207.8	207.8	208.2	208.2	209.2	210.2	210.2	210.2	210.2	208.4
	1979	213.9	213.9	214.4	214.4	214.4	214.4	214.4	214.4	215.0	219.0	219.0	219.0	215.5
	1980	219.0	219.0	219.0	226.1	226.1	226.1	226.1	226.6	228.6	229.3	231.9	237.0	226.2
	1981	237.0	237.2	237.4	237.4	237.4	237.4	237.4						
Cast iron soil pipe and fittings, all sizes - Tuyaux et raccords de rejets en fonte, toutes dimensions.	1971	95.9	95.9	100.8	100.8	100.8	100.8	100.8	100.8	100.8	100.8	100.8	100.8	100.0
	1972	100.8	100.8	102.3	102.3	102.3	99.9	99.9	99.9	99.9	99.9	99.9	99.9	100.7
	1973	95.5	93.3	93.3	93.3	93.3	93.3	93.3	93.3	95.5	95.5	98.4	102.1	95.0
	1974	103.6	107.8	115.2	124.9	134.0	134.0	134.0	142.1	142.1	142.1	150.3	150.3	131.7
D 630632 12 2940 702	1975	150.3	155.3	155.3	156.9	156.9	157.3	157.3	158.8	158.8	162.9	164.4	164.4	158.2
	1976	164.4	164.4	166.3	167.0	167.0	167.0	167.0	167.2	167.2	167.2	167.2	167.2	166.6
	1977	167.2	161.1	161.7	168.5	169.5	169.5	169.5	173.5	173.5	173.5	173.5	173.5	169.5
	1978	175.4	175.4	175.4	179.8	179.8	179.8	179.8	179.8	179.7	185.3	185.3	188.8	180.4
	1979	188.8	188.8	199.1	220.8	221.3	221.5	222.4	232.4	220.6	220.6	227.2	235.1	216.6
	1980	247.4	254.4	276.9	276.9	276.9	276.9	301.6	301.6	301.6	301.6	300.9	300.9	284.8
	1981	300.9	311.3	308.9	308.9	313.8	313.8	313.8						
SMELTING AND REFINING - FONTE ET AFFINAGE	1956	73.8	73.4	74.4	75.0	74.3	73.9	71.3	72.5	72.4	70.9	70.9	72.6	73.0
	1957	72.7	71.7	70.6	70.9	69.4	68.3	67.0	66.5	66.5	66.5	66.3	65.9	68.5
	1958	66.5	65.7	65.5	63.3	63.1	62.9	62.6	62.9	63.8	64.9	65.9	65.2	64.4
	1959	65.3	66.0	66.4	65.6	66.4	66.2	65.6	66.0	66.0	66.3	67.0	67.0	66.2
D 528301 12 2950	1960	67.9	67.7	67.8	68.5	69.1	69.2	68.8	68.2	68.1	67.8	67.7	67.3	68.2
	1961	67.5	66.7	66.8	66.9	67.7	68.5	71.9	71.8	71.8	71.8	71.7	72.3	69.6
	1962	72.3	72.0	71.9	72.1	74.3	73.6	73.5	73.5	73.6	73.6	73.7	73.2	73.1
	1963	73.3	73.4	73.4	73.4	73.6	73.6	73.9	74.0	74.0	74.4	74.6	74.8	73.9
	1964	75.5	75.5	76.1	77.0	77.1	77.1	77.3	77.3	78.7	78.7	79.1	79.8	77.4
	1965	79.6	80.0	80.1	79.8	81.9	81.9	82.0	81.7	81.7	81.4	82.8	82.9	81.3
	1966	85.5	85.6	85.5	85.3	85.3	85.3	85.3	85.3	85.3	85.2	87.6	87.6	85.7
	1967	87.6	89.3	89.5	89.5	89.5	89.6	89.5	89.4	91.9	91.8	91.9	94.7	90.4
	1968	94.6	97.4	98.4	94.0	91.9	93.3	90.7	90.4	91.3	90.6	90.8	92.2	93.0
	1969	96.5	97.2	97.7	99.0	99.5	101.4	100.9	104.1	104.4	104.2	105.4	113.3	102.0
	1970	112.8	113.5	115.5	115.4	112.8	109.2	106.4	104.2	103.5	103.2	102.5	100.7	108.3
	1971	100.3	98.4	99.9	101.4	100.8	100.4	101.9	100.7	99.9	99.0	99.0	98.3	100.0
	1972	100.1	100.9	101.9	101.7	101.3	99.7	101.1	100.6	103.6	103.4	103.4	105.1	101.9
	1973	107.9	111.6	118.6	122.1	130.0	130.0	135.3	134.9	135.1	139.6	141.3	140.9	128.9
	1974	148.0	157.2	166.8	171.8	170.9	165.1	160.8	163.3	160.2	158.9	164.4	161.2	162.5
	1975	164.0	166.4	165.8	164.1	166.2	163.1	163.9	166.8	165.4	164.4	162.2	160.6	164.4
	1976	159.4	157.5	159.6	162.0	163.4	163.3	165.7	165.8	164.1	164.1	169.0	186.3	165.1
	1977	190.7	194.4	203.0	204.4	205.0	200.6	203.5	196.7	198.9	203.7	203.3	201.8	200.7
	1978	206.6	208.0	210.4	216.0	208.5	213.3	213.5	223.6	227.4	240.0	239.5	240.2	220.6
	1979	248.6	270.4	272.2	280.5	290.8	301.1	299.4	301.9	317.8	350.6	346.1	367.7	303.9
	1980	435.7	437.4	391.4	378.2	371.9	380.2	385.9	390.6	404.1	411.4	397.9	389.0	397.8
	1981	383.9	367.1	371.5	368.9	372.5	370.4	359.2						
Copper refined, total - Cuivre affiné, total	1961	62.6	60.4	60.4	60.4	63.1	63.9	65.9	65.9	65.9	65.9	65.9	65.9	64.0
	1962	65.9	65.9	65.9	66.6	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	68.2
	1963	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2	69.2
	1964	69.2	69.2	69.2	72.0	72.0	72.0	72.0	72.0	76.9	76.9	76.9	76.9	72.9
D 528383 12 2950 004	1965	76.9	76.9	76.9	76.9	84.6	84.6	84.6	84.6	84.6	84.6	89.5	89.5	82.9
	1966	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9	98.9
	1967	98.9	103.8	103.8	103.8	103.8	103.8	103.8	103.8	103.8	103.8	103.8	112.1	104.1
	1968	112.1	121.3	121.6	108.1	100.8	103.9	95.0	95.3	97.7	96.5	96.4	101.6	104.2
	1969	107.5	108.9	110.2	114.6	115.7	121.9	118.8	130.9	130.8	128.7	131.8	136.1	121.3
	1970	132.4	134.5	141.9	141.5	133.5	124.2	118.5	113.9	113.2	109.0	104.5	99.0	122.2
	1971	97.8	94.8	99.3	109.2	104.5	101.4	103.3	102.6	99.2	97.7	95.9	94.8	100.0
	1972	97.4	99.2	102.1	101.8	99.5	94.1	95.0	95.6	93.9	91.9	92.4	93.3	96.3
	1973	99.6	108.2	123.8	132.1	140.6	140.6	134.1	163.9	156.7	170.0	179.2	165.4	144.7
	1974	166.8	181.6	206.4	214.4	210.6	191.8	165.8	150.1	140.5	135.9	133.7	122.7	169.1
	1975	118.3	117.6	120.9	121.0	118.0	112.7	115.7	119.8	114.2	113.4	111.8	110.8	116.2
	1976	113.2	112.7	116.0	126.5	132.5	133.0	143.8	137.3	136.6	130.3	134.7	122.1	126.6
	1977	133.2	137.7	146.7	150.7	148.7	143.0	137.7	129.7	126.8	128.9	127.6	129.8	136.7

Note: Indexes for the most recent six months shown are subject to revision.
Nota: Les indices figurant pour les six mois les plus récents sont sujets à révision.
See footnote(s) at end of table. - Voir note(s) à la fin du tableau.

Appendix A: Excerpt Statistics Canada Occassionally Publication 62-543: Industry Selling Price Indexes; 1971 = 100, 1956-1976

TABLE 3. Base Period (1971) Weights[1] of Industries and Commodities – Continued

TABLEAU 3. Coefficients de pondération[1] de la période de base (1971) des industries et des produits – suite

CANSIM D-code monthly Code D CANSIM mensuel	1971 Industry Selling Price Index Identification Number Numéro d'identification de l'indice des prix de vente dans l'industrie de 1971	Major group, industry or commodity Groupe, industrie ou produit	Per cent of industry Pourcentage de l'industrie	Per cent of total Industry Selling Price Index Pourcentage de l'indice total des prix de vente dans l'industrie
... ...	..	Primary metal industries – Première transformation des métaux		7.970
D527101	12 2910	IRON AND STEEL MILLS – SIDERURGIE	100.00	3.054
D527233	12 2910 036	Blooms, billets, slabs and other semi-finished shapes (excluding continuous cast) carbon steel for re-rolling – Blooms, billets, brames et autres profilé semi-ouvrés (sauf les moulages de coulée continue) d'acier ordinaire pour relaminage	3.04	.093
D527305	12 2910 043	Bars, concrete reinforcing – Barres, pour béton armé	5.90	.180
D527430	12 2910 053	Wire, rods, hot rolled or cold finished, No. 5 gauge – Fils machine, n° 5, laminés à chaud ou parachevés à froid, autres	1.00	.031
D527438	12 2910 054	Wire rods, hot rolled or cold finished, other – Fils machine, laminés à chaud ou parachevés à froid, autres		
D527570	12 2910 078	Structural steel shapes, unfabricated, beams, wide, flanged, heavy carbon steel – Profilés de charpente d'acier non travaillées, poutres, à semelles larges, de grandes dimensions, d'acier ordinaire	5.04	.154
D527585	12 2910 080	Structural steel shapes, unfabricated, heavy intermediate – Profilés de charpente d'acier, non travaillées, de grandes et moyennes dimensions		
D527606	12 2910 081	Structural steel shapes, unfabricated, bar size, carbon, light – Profilés de charpente d'acier, non travaillées, dimension de la barre, d'acier ordinaire, de petites dimensions	1.31	.040
D527630	12 2910 085	Rails	2.34	.071
D527638	12 2910 125	Coke	.62	.019
D527754	12 2910 704	Bars, hot rolled, other (excluding stainless) – Barres, laminées à chaud, autres (sauf en acier inoxydable)	8.89	.272
D527755	12 2910 705	Sheet and strip, hot rolled, carbon – Feuilles et feuillards, laminés à chaud, d'acier ordinaire	10.73	.328
D527757	12 2910 707	Rates, carbon and alloy (including "skelp") – Tôles, d'acier ordinaire et d'acier allié (y compris "skelp")	10.44	.319
D527760	12 2910 708	Bars, cold rolled and cold drawn, carbon and alloy – Barres, laminées à froid et étirées à froid, d'acier ordinaire et d'acier allié	1.60	.049
D N/A	12 2910 N/A	Cold rolled strip – Feuillards, laminées à froid	2.21	.068
D N/A	12 2910 N/A	Other cold rolled and coated products – Autres produits, laminées à froid et recouverts	25.46	.776
		All other commodities – Tous les autres produits	21.42	.654
D527801	12 2920	STEEL PIPE AND TUBE MILLS – FABRIQUES DE TUBES ET TUYAUX D'ACIER	100.00	.523
D528001	12 2940	IRON FOUNDRIES – FONDERIES DE FER	100.00	.433
D528017	12 2940 002	Iron castings, gray iron, municipal (manhole covers) – Fontes de moulage, fontes grises, pour voirie municipale (couvercles de puits d'accès)	25.43	.110
D528036	12 2940 003	Iron castings, gray iron, ingot moulds and stools – Fontes de moulage, fontes grises en moules et sans moules pour ingots		
D528045	12 2940 004	Iron castings, gray iron, n.e.s. – Fontes de moulage, fontes grises, n.d.a.		
D528066	12 2940 005	Iron castings, malleable iron – Fontes de moulage, malléables	6.87	.030
D528126	12 2940 018	Cast iron, soil pipe; under 6 inches, inside diameter – Tuyaux de renvoi en fonte, diamètre intérieur, de moins de 6 pouces	1.94	.008
D528138	12 2940 019	Cast iron soil pipe, 6 inches inside diameter and over – Tuyaux de renvoi en fonte, diamètre intérieur, de 6 pouces et plus	.64	.003
D528144	12 2940 020	Cast iron soil pipe fittings, all sizes – Raccords de tuyaux de renvoi en fonte, toutes dimensions	1.77	.008

TABLE 3. Base Period (1971) Weights[1] of Industries and Commodities – Continued

TABLEAU 3. Coefficients de pondération[1] de la periode de base (1971) des industries et des produits – suite

CANSIM D-code monthly – Code D CANSIM mensuel	1971 Industry Selling Price Index Identification Number – Numéro d'identification de l'indice des prix de vente dans l'industrie de 1971	Major group, industry or commodity – Groupe, industrie ou produit	Per cent of industry – Pourcentage de l'industrie	Per cent of total Industry Selling Price Index – Pourcentage de l'indice total des prix de vente dans l'industrie
D528156	12 2940 021	Cast iron water pipe – Tuyaux d'eau en fonte	13.90	.060
D528172	12 2940 022	Cast iron water pipe fittings, all sizes – Raccords de tuyaux d'eau en fonte, toutes dimensions		
D528195	12 2940 024	Malleable iron pipe fittings, all sizes – Raccords de tuyaux en fonte malléable, toutes dimensions	2.95	.013
		All other commodities – Tous les autres produits	46.50	.201
D528301	12 2950	SMELTING AND REFINING – FONTE ET AFFINAGE	100.00	2.707
D528363	12 2950 004	Copper refined, total – Cuivre affiné, total	35.18	.952
D528390	12 2950 005	Zinc refined, total – Zinc affiné, total	10.62	.287
D528439	12 2950 007	Precious metals – Métaux précieux	11.60	.314
D528506	12 2950 008	Antimony – Antimoine	.04	.001
D528512	12 2950 009	Cadmium	.54	.015
D528532	12 2950 010	Cobalt	.70	.019
D528538	12 2950 011	Magnesium – Magnésium	.35	.010
D528569	12 2950 014	Bismuth	.10	.003
D528575	12 2950 015	Titanium dioxide – Bioxide de titane	2.67	.072
D528594	12 2950 017	Iron remelt – Mineral de fer, refondu	2.02	.055
		All other commodities – Tous les autres produits	36.18	.979
D528701	12 2960	ALUMINUM ROLLING, CASTING AND EXTRUDING – LAMINAGE, MOULAGE ET EXTRUSION DE L'ALUMINIUM	100.00	.464
D528715	12 2960 004	Aluminum extruding shapes – Profilés d'aluminium	18.46	.086
D528807	12 2960 016	Aluminum base other products (castings, except aluminum die) – Autres produits à la base d'aluminium (moulage, sauf moulage d'aluminium sous pression)	3.91	.018
		All other commodities – Tous les autres produits	77.63	.360
D528901	12 2970	COPPER AND COPPER ALLOY ROLLING, CASTING AND EXTRUDING – LAMINAGE, MOULAGE ET EXTRUSION DU CUIVRE ET DE SES ALLIAGES	100.00	.493
D528919	12 2970 008	Copper, unalloyed, pipe and tubing – Cuivre non allié, tuyaux et tubes	22.15	.109
D528936	12 2970 009	Copper, unalloyed, plates, sheets, strip and flat products – Cuivre non allié, tôles, feuilles, feuillards et produits plats	9.94	.049
D528966	12 2970 013	Copper, alloyed, castings (excluding pipe fittings) – Moulages en alliages de cuivre (sauf les raccords de tuyauterie)	3.93	.019
D528994	12 2970 015	Copper, alloyed, pipe and tubing – Tubes et tuyaux en alliages de cuivre	3.17	.016

See footnote(s) at end of table. – Voir note(s) à la fin du tableau.

D529009	12 2970 016	Copper, alloyed, plates, sheets, strip and flat products – Tôles, feuilles, feuillards et produits plats en alliages de cuivre	13.46	.066
		All other commodities – Tous les autres produits	47.33	.234
D529101	12 2980	METAL ROLLING, CASTING AND EXTRUDING, N.E.S. – LAMINAGE, MOULAGE ET EXTRUSION DES MÉTAUX, N.D.A.	100.00	.296
D529102	12 2980 001	Secondary non-ferrous metals, aluminum – Métaux non ferreux, de seconde fusion, aluminium	9.91	.029
D529116	12 2980 002	Secondary non-ferrous metals, lead, unalloyed – Métaux non ferreux, de seconde fusion, plomb non allié	1.74	.005
D529121	12 2980 007	Alloys, non-ferrous, copper, base alloys – Alliages non-ferreux, alliages à base de cuivre	8.60	.025
D529135	12 2980 010	Alloys, non-ferrous, lead, antimonial, secondary – Alliages non ferreux de plomb, d'antimoine, de seconde fusion	5.51	.016
D529152	12 2980 011	Alloys, non-ferrous, solders – Alliages, non ferreux, soudures	6.17	.018
D529174	12 2980 012	Alloys non-ferrous – type and type metal – Alliages non ferreux, de métal d'imprimerie	1.04	.003
D529186	12 2980 014	Casting, die aluminum, based alloy – Moulages sous pression, alliages à base d'aluminium	8.57	.025
D529200	12 2980 015	Casting, die, zinc, base alloy – Moulages sous pression, alliages à base de zinc	13.73	.041
		All other commodities – Tous les autres produits	44.73	.134

Appendix B: Statistics Canada check list of factors to consider in contract escalation

2. Define escalation model

3. Index selection

.1 Review company costs.

Estimated Contract Costs

A.	Major components	Identification of Main Sub-components
Direct costs		
Materials		
Equipment		
Labour		
Shop		
Field		
Other costs		
Foreign exchange		
Cost of money		
Design costs		
Field supervision		
All other expense		
Profit		

3. B. Important Sub-components:

Annual Cost/Price Change
1978 1979 1980 1981 1982

Selected important sub-components

1. Company
   Statistics Canada Series (a)
   (b)

2. Company
   Statistics Canada Series (c)
   (d)

3.2.2 Characteristics of indexes
3.2.3

Index	Components	Weights			Markets included		Foreign currency adjustements of big importance?
		Statistics Canada	Contract weights(1)				
			%	Price year	Domestic	Export	
1.							
2.							
3.							

Other important factors (not mentioned above).

1.
2.
3.

(1) Weights will probably relate to the current year. To be precise they should be stated in the time reference year of the Statistics Canada series, e.g. 1971 for 1971=100 series.

4. Characteristics of historical month-to-month price movement

A

Price change						Average size of revisions to recent indexes
For each index	Steady increases	Mainly increases, with small decreases	Mainly increases with some large decreases	Mixed Price change in each year	Mainly declines	
Behaviour 73/74 (inflation)						
Behaviour 74/75 (deflation)						
Recent 2-3 years						

B Recommended series for inclusion in the contract.

Series identification	Recent Changes Statistics: Company Canada : costs	Data to be Smoothed Yes/No	No. of days from data collection to data release

Elements usually included in company contracts

1.

2.

3.

Proposed new elements

1.

2.

Other factors

(a) Is either party a major respondent to tne above? Yes___ No___

(b) Has Statistics Canada been asked to notify the company about proposed structural changes to these series Yes___ No___

(c) Estimated future cash flow requirement captured by these series:

	Estimated Proportion of Future Cash Flow Requirement Captured by Indexes Selected	Estimated size of required contingency for the remainder
Traditional elements		
Non.traditional elements		

5. The mechanics of escalation adjustment

Formula, weights and smoothing mechanisms:

Base value

Periodicity of application of escalation mechanisms

Forecasted length of contract (months)

Citations for indexes entering into contract.

Contract adjusted by percentage changes? Yes___ No___

Limits specified for escalation adjustments: Yes___ No___. If yes, specify

Mechanism for handling revisions:
Structural

Levels of most recently published data

Numerical example of application of escalation mechanisms.

Name, addresses, phone numbers of contacts for information about series cited.

POOR

QUALITY

ORIGINAL